

IN THE CLAIMS

Claims 1-56 (canceled)

57. (previously presented) A method of providing a CMOS RF power amplifier for a wireless transmission system comprising:

providing an input stage including one or more devices having a first gate oxide thickness;

providing an output stage including a plurality of switching devices having a second gate oxide thickness; and

selecting the thickness of the first and second gate oxides such that the second gate oxide thickness is greater than the first gate oxide thickness, wherein the first gate oxide thickness is selected based on desired breakdown voltage levels of devices in the input stage and the second gate oxide thickness is selected based on desired breakdown voltage levels of devices in the output stage.

58. (previously presented) The method of claim 57, further comprising forming the RF power amplifier on a single integrated circuit.

59. (previously presented) The method of claim 57, wherein the first gate oxide thickness is approximately 70 Angstroms.

60. (previously presented) The method of claim 57, wherein the second gate oxide thickness is approximately 140 Angstroms.

61. (previously presented) The method of claim 57, wherein the first portion forms a preamplifier circuit.

62. (previously presented) The method of claim 61, wherein the second portion forms an amplifier circuit.

63. (new) A method of providing a complementary metal oxide semiconductor (CMOS) RF power amplifier for a wireless transmission system comprising:
using devices with a first gate oxide thickness to form RF power amplifier input stage circuitry;
identifying a breakdown voltage level for devices used in the input stage circuitry;
selecting the first gate oxide thickness for the devices used in the input stage circuitry based on the identified breakdown voltage level for devices used in the input stage circuitry;
using devices with a second gate oxide thickness to form RF power amplifier output stage circuitry;
identifying a breakdown voltage level for devices used in the output stage circuitry;
and
selecting the second gate oxide thickness for the devices used in the output stage circuitry based on the identified breakdown voltage level for devices used in the output stage circuitry, wherein the first gate oxide thickness is less than the second gate oxide thickness.

64. (new) The method of claim 63, wherein the first gate oxide thickness is approximately 70 Angstroms.

65. (new) The method of claim 63, wherein the second gate oxide thickness is approximately 140 Angstroms.

66. (new) The method of claim 63, further comprising using one or more inverters in the input stage circuitry.

67. (new) The method of claim 66, further comprising using a plurality of switching devices in the output stage circuitry.

68. (new) A method of providing a cellular telephone apparatus comprising:
providing a transceiver for transmitting and receiving signals;
forming an RF power amplifier using a complementary metal oxide semiconductor (CMOS) device;
coupling the RF power amplifier to the transceiver;
using devices with a first gate oxide thickness to form input stage circuitry for the RF power amplifier;
using devices with a second gate oxide thickness to form output stage circuitry for the RF power amplifier;
selecting the first gate oxide thickness based on identified breakdown voltage levels of devices in the input stage circuitry;

selecting the second gate oxide thickness based on identified breakdown voltage levels of devices in the output stage circuitry, wherein the first gate oxide thickness is less than the second gate oxide thickness; and
coupling an antenna to the RF power amplifier and the transceiver for transmitting and receiving signals.

69. (new) The method of claim 68, wherein the first gate oxide thickness is approximately 70 Angstroms.

70. (new) The method of claim 68, wherein the second gate oxide thickness is approximately 140 Angstroms.

71. (new) The method of claim 68, further comprising using one or more inverters in the input stage circuitry.

72. (new) The method of claim 71, further comprising using a plurality of switching devices in the output stage circuitry.